Application No. 10/666,048 Response dated January 24, 2008 Reply to Office Action of April 6, 2007

IN THE CLAIMS:

- 1. (Original) Thermally modified carbon blacks comprising a particle size of between 7nm to 500nm and an oil adsorption number between 30 to 300 ml/100g, for use in curing bladders in tire manufacture, which, in compounds, exhibit improved thermal conductivity and increased fatigue life when compared to conventional bladder compounds.
- 2. (Original) The thermally modified carbon blacks in claim 1, wherein the carbon black is produced by a continuous electrothermal furnace treatment process.
- 3. (Original) The thermally modified carbon blacks in claim 1, wherein the thermally modified carbon blacks are used in combination with furnace blacks.
- 4. (Original) The thermally modified carbon blacks in claim 1, wherein when used in curing bladders, replace acetylene blacks and conventional carbon blacks.
- 5. (Currently amended) An improved curing bladder compound composition, comprising thermally modified carbon blacks having a particle size of between 7nm to 500nm and an oil adsorption number between 30 to 300 ml/100g, which, when combined with furnace blacks, exhibit improved thermal conductivity and increased fatigue life when compared to conventional bladder compounds.
- 6. (Original) The improved curing bladder compound in claim 5, wherein the bladder compound provide curing bladders with increased service life.
- 7. (Original) A thermally modified carbon black, produced by a continuous electrothermal furnace treatment process, for use in curing bladders in tire manufacture, which exhibit improved thermal conductivity and increased fatigue life when compared to conventional bladder compounds.
- 8. (Original) The thermally modified carbon black in claim 7, comprising a particle size of between 7nm to 500nm and an oil adsorption number between 30 to 300 ml/100g.
- 9. (Original) Thermally modified carbon blacks, produced by a continuous electrothermal furnace treatment process, the blacks having a particle size of between 7nm to 500nm and an oil adsorption number between 30 to 300 ml/100g, for use in curing bladders in tire manufacture, which exhibit improved thermal conductivity when compared to conventional

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bladder compounds.

- 10. (Original) The thermally modified carbon blacks in claim 9, wherein the conventional bladder compounds include acetylene black.
- 11. (Original) The thermally modified carbon blacks in claim 9, wherein the blacks also improve the fatigue life of the compound.
- 12. (New) An improved carbon black composition, comprising thermally modified carbon blacks having a particle size of between 7nm to 500nm and an oil adsorption number between 30 to 300 ml/100g, which, when combined with furnace blacks, exhibit improved thermal conductivity and increased fatigue life when compared to conventional bladder compounds.
- 13. (New) The composition in claim 12, wherein the composition is used in a curing bladder of the type used in the manufacture of vehicle tires.